

# PROJECT MANAGEMENT APPRENTICESHIP AND MENTORING PROGRAM

PROGRAM GUIDELINES

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# PROJECT MANAGEMENT APPRENTICESHIP AND MENTORING PROGRAM Program Guidelines

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#### INTRODUCTION

The Information Technology Department, in collaboration with the Enterprise Project Management Advisory Group, the Architecture Review Board, and with approval of the State Information Technology Advisory Committee, has chosen the National Information Technology apprenticeship System (NITAS) workforce development program as a learning curriculum for project management. In addition, NITAS will serve to coordinate, validate, and document the progress of state information technology employees' mastery of project management.

NITAS is a nationwide, competency based workforce development and skill validation program for the U. S. information technology industry. The program reflects an industry-wide initiative to ensure the performance, quality and competitiveness of U.S. IT workers. The NITAS program was developed by CompTIA under a grant provided by the Federal Department of Labor. CompTIA is an industry leader in the field of information technology training and certification.

For the purpose of sharing information and growing knowledge throughout the state, mentoring relationships, in many cases, will cross agency boundaries. This means that a project management apprentice in one state agency could likely be paired with a mentor from a different state agency.

#### **GENERAL TERMS AND CONDITIONS**

#### Section I. - Equal Opportunity Pledge

The recruitment, selection, employment, and training of apprentices during their apprenticeship, will be without discrimination because of race, color, religion, national origin, or sex. The employer will take affirmative action to provide equal opportunity in apprenticeship.

#### Section II. - Affirmative Action Plan

Employers with Affirmative Action plans and related requirements shall take into account such goals in the selection of apprentices.

## Section III. - Selection of Apprentices

Prospective apprentices must apply for acceptance into the program (<u>Appendix B</u>). The apprentice's employer will review, coordinate and prioritize all applications from the employing agency. The agency Information Technology Director, or designee, will rank all agency applications in order of priority in relation to the business needs of the agency.

Upon completion of the ranking process, the agency IT Director will forward all applications to the sponsor. Upon receipt, the sponsor, in coordination with the Enterprise Project Management Advisory Group, will review the applications for compliance with the minimum qualifications of the concentration as described in  $\underline{\mathsf{Appendix}\ \mathsf{A}}$ .

Should there be an abundance of applications, the sponsor, in coordination with the Enterprise Project Management Advisory Group, will prioritize the acceptance of apprentices into the program in accordance with the needs of the State of North Dakota to successfully manage projects based on size, cost, and complexity.

## Section IV. - Apprenticeship Agreement

By applying for acceptance into the program, applicants are agreeing to the terms and conditions contained in this program guideline. This agreement provides the minimum terms and conditions of the program. Agencies may create addendums which add to their individual employee requirements. However, all addendums must be reviewed and approved by the sponsor prior to enrollment.

#### Section V. - Ratio of Apprentices to Mentors

Only that number of apprentices will be accepted into the program as can be given proper supervision and training by the program mentors. Mentors will have the option as to how they would like to work with their apprentices. These options are:

One to One - Individual mentoring

One of Many - Individual mentoring of multiple apprentices

Group Facilitation – Meet as a group, mentor as a group when possible, perform Qual Cards individually

While mentors have the option of how they would like to work with their apprentices, apprentices may have a preference which option works best for them. If apprentices do have a preference, they should know a delay is possible in assigning them with a mentor based on their choice of option preference.

#### Section VI. - Time Expectations

The amount of time required to complete the NITAS apprenticeship program depends on the complexity of the project. All concerned should expect this to take longer than prior projects as each step of project management process will be required to have been completed per the NITAS Qual Cards.

It should be know that the time expectations for the apprentice will increase as they work through the requirements of each Qual Card, document the information required in the Qual Cards, schedule their reviews with their mentor, and follow up with any deficiencies noted by their mentor. Each of these tasks will add to the amount of time required in addition to the selected project itself. While the time varies with the complexity of their project, time planning should include 1-2 hours per week plus preparatory time for documentation and follow up time of an additional three to four hours per week.

NITAS is an apprentice driven program and the onus is on the apprentice to direct their individual NITAS certification experience; e.g. seek out additional learning opportunities, upload project documentation to the NITAS site, document progress and prepare for mentor meetings, schedule mentor/apprentice meetings, and complete deficiencies noted during the mentorship process.

The mentor's typical time investment for a one-on-one apprentice relationship would be an average of 1-2 hours per week; however, this is dependant on the complexity of the apprentice's chosen project.

### Section VII. - Term of Apprenticeship

The term of apprenticeship shall be continuous, including the probationary period. Full On-The-Job Learning (OJL) credit will be given for the probationary period. Minimum and maximum terms of apprenticeship may be contained in the criteria of the corresponding concentration (e.g. project management).

The apprentice's progress in each phase of apprenticeship may be determined on an actual hour basis. Therefore, an apprentice who, by unusual aptitude or past education and/or practical experience, achieves the desired level in a phase of the apprenticeship in less than the time designated may be advanced to the next phase. The determination of such advancement is the responsibility of the sponsor, with input from the assigned mentor.

## Section VIII. - Probationary Period

All applicants selected for apprenticeship will serve a program probationary period of not less than the **90 days** of OJL. The probationary period will be applied only once.

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At any time during the probationary period the apprentice may terminate the Apprenticeship Agreement without penalty by notifying the other party in writing. This cancellation must be approved by the apprentice's supervisor.

Each probationary apprentice's performance in the program will be reviewed by the mentor prior to the end of the probationary period. Any probationary apprentice evaluated as satisfactory after a review of the probationary period will be given full credit for the probationary period. The apprentice will be granted any authorized credit for previous OJL, certification, hours of prior learning, and will continue in the program. Any probationary apprentice evaluated as unsatisfactory after a review of the probationary period will be scheduled for a consultation between the apprentice, his/her supervisor, the mentor, and the sponsor. At this time, a corrective action plan will be developed.

#### Section IX. - Work Related Activities

The employer agrees to provide the apprentice with adequate time, resources, and opportunity to successfully complete the requirements of the apprenticeship program.

#### Section X. - Apprentice Wage Progression

As the successful completion of an apprenticeship program results in newly acquired skills and abilities, employers are encouraged to review existing opportunities for wage progression (e.g. workload adjustments, reclassification, etc.). Each employer will independently determine the appropriateness of potential apprentice wage progression opportunities taking into consideration market conditions, budget restrictions, etc.

#### Section XI. - Credit for Previous Work and Education Experience

The sponsor may grant credit towards the term of apprenticeship to new apprentices who demonstrate previous acquisition of skills or knowledge equivalent to that which would be received under these guidelines.

Apprentice applicants seeking credit for previous experience must submit the request at the time of application and furnish such records, affidavits, and other documents to substantiate the claim. The request for credit will be evaluated and a determination made by the sponsor and assigned mentor during the probationary period when actual on-the-job and related instruction performance can be examined. Prior to completion of the probationary period, the amount of credit to be awarded will be determined after review of the apprentice's previous work and training/education record and evaluation of the apprentice's performance and demonstrated skill and knowledge during the probationary period.

The granting of advanced standing will be uniformly applied to all apprentices. Past learning or prior work experience during the past six consecutive years may be considered for credit. This six year timeline follows the requirements as established by the Project Management Institute (PMI) of individuals who are applying for their Project Management Professional certification.

Previous work experience is defined as work performed in the conduct of a project. Project work does not necessarily mean that the apprentice was working as a project manager. He or she may have been working on a project in another project management related capacity. Previous work experience must be confirmed by the employer. The minimum requirement for previous work experience is 40 hours.

Previous education is defined as project management education taught by a qualified instructor or by an employer. Training must be approved and validated by employer on company letterhead or Certificate of Attendance.

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In addition to the "hard skills" of project management, there are "soft skills" that an apprentice needs to possess and/or develop. Soft skills are such items as communications skills, presentation skills, negotiation skills, team building skills, leadership skills, and executive coaching skills. Customers want professionals who are effective at hearing their needs, communicating in their language, managing expectations, building trust, and resolving issues.

#### Section XII. - Credit for On the Job Learning

During the apprenticeship the apprentice will receive such OJL and related instruction in all phases of the occupation necessary to develop the skill and proficiency of the desired level of certification. The OJL will be under the direction and guidance of a mentor.

#### Section XIII. - Related Instruction

During each concentration as outlined in <u>Appendix A</u>, the apprentice is required to participate in coursework related to the prescribed concentration. Apprentices agree to take such courses as the sponsor deems advisable. Unless otherwise noted, apprentices should receive prior approval from their assigned mentor as to the appropriateness of proposed coursework or instruction.

Each employer will determine their policy as it relates to funding, reimbursement, or compensation for hours spent attending related instruction courses.

To the extent possible, related instruction will be closely correlated with the practical experience and training received on the job. The assigned mentor will monitor and verify the apprentice's progress in obtaining and recording related instruction classes.

#### Section XIV. - Supervision of Apprentices

The employer will retain responsibility for the supervision of the apprentice and will provide practical opportunities for OJL. For purposes of the NITAS program, apprentices will be under the general supervision of the sponsor and under the direct supervision of the mentor to whom they are assigned.

No apprentice will be allowed to earn credit in the program without mentor supervision.

## <u>Section XV. – Monitoring Progress and Corrective Action</u>

Before the apprentice may advance to each successive level of concentration (see <u>Appendix A</u>), or at any other time when conditions warrant, the sponsor will evaluate the apprentice's record to determine whether he/she has met the requirements of the program.

If an apprentice's related instruction or on-the-job progress is found to be unsatisfactory, the sponsor, with input from the mentor, may determine whether corrective action is warranted. The sponsor may suspend or cancel the agreement only after the apprentice receives a reasonable opportunity for corrective action. In such cases, the sponsor will provide written notice to the apprentice of the final action taken. Any corrective action, including suspension or cancellation of program involvement, will be done in accordance with State of North Dakota laws and Administrative Rules.

Should it be found that the apprentice does not have the ability or desire to continue the program to complete the concentration, the sponsor and employer will terminate the Apprenticeship Agreement after the apprentice has been given adequate assistance and opportunity for corrective action.

## Section XVI. - Certificate of Completion of Apprenticeship

Upon satisfactory completion of the requirements of the apprenticeship program, including a successful capstone presentation, the sponsor will so certify in writing to NITAS and request that a Certificate of Completion of apprenticeship be awarded to the completing apprentice(s) for each concentration completed.

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<u>Capstone Presentation</u> – Each apprentices will, at the conclusion of the apprenticeship period, present their project to a board of review. The board will consist of the primary mentor and two independent mentors. Apprentices must successfully pass this process to obtain certification.

#### Section XVII. – Record Retention

Each apprentice will be responsible for maintaining a record of his/her work experience/training on the job and related instruction and for having this record verified by his/her mentor. All data, written records of progress evaluations, corrective and final actions pertaining to the apprenticeship, will be maintained by and the property of the sponsor. This record will be included in each apprentice's record file maintained by the sponsor. Individual employers should determine the type and level of record-keeping to be maintained at the agency level, in accordance with State records retention guidelines.

#### Section XVIII. - Maintenance of Records

During the course of the apprenticeship, the sponsor will maintain all records relating to apprentice applications (whether selected or not), the employment and training of apprentices, and any other information relevant to the operation of the program. This includes, but is not limited to, records on the recruitment, application and selection of apprentices. Upon completion of the program, all records will be released to the employing agency. The employing agency will be responsible to maintain records retention in accordance with the North Dakota Century Code.

#### Section XIX. - Notice to Sponsor

The sponsor will be notified promptly of all credit granted, suspensions for any reason, reinstatements, extensions, modifications, completions, cancellations, and terminations of apprenticeship agreements and causes.

#### Section XX. - Cancellation and Deregistration

The sponsor reserves the right to discontinue at any time the apprenticeship program set forth herein.

Within fifteen (15) days of cancellation of the apprenticeship program, the sponsor will notify each apprentice of the cancellation and the effect of same.

## Section XXI. - Amendments or Modifications

These guidelines may be amended or modified at any time by the sponsor provided that no amendment or modification adopted will alter any Apprenticeship Agreement in force at the time without the consent of all parties. A copy of each amendment or modification adopted will be furnished to each apprentice to whom the amendment or modification applies.

### Section XXII. - Adjusting Differences/Complaint Procedure

The sponsor will have full authority to supervise the enforcement of these guidelines. Its decision will be final and binding on the sponsor and the apprentice. Whenever warranted, the sponsor will consult with the employing agency.

## Section XXIII. - Transfer of Mentoring Obligation

The sponsor may transfer an apprentice, with his/her consent, from one mentor to another.

#### Section XXIV. - Responsibilities of the Apprentice

Apprentices, having read these guidelines formulated by the sponsor and signed an Apprenticeship Agreement with the sponsor agree to all the terms and conditions contained therein, including any amendments, perform required OJL, participate in training, and study such subjects as the sponsor may deem necessary to complete the program.

In signing the Apprenticeship Application, (<u>Appendix B</u>) apprentices assume the following responsibilities and obligations under the apprenticeship program:

- A. Perform diligently and faithfully the work as prescribed by the program and authorized by the mentor in accordance with the provisions of these guidelines.
- B. Respect the property of the employer and abide by the working rules and regulations of the employer.
- C. Attend and satisfactorily complete the required hours in the OJL and in related instruction in subjects related to the occupation as provided under the NITAS program and these guidelines.
- D. Maintain and make available such records of work experience and training received on the job and in related instruction as may be required by the mentor and/or sponsor.
- E. Develop and practice safe working habits and work in such a manner as to assure his/her personal safety and that of other workers.
- F. Read and understand the program guidelines. The apprentice will be provided with a copy of the program guidelines and will sign an acknowledgment receipt of same on the Apprenticeship Application. This procedure will be followed whenever revisions or modifications are made to the guidelines.

### <u>Section XXV. – North Dakota State and Higher Education Standards</u>

Apprentices and mentors need to be aware of, and keep in mind; there are standards that must be adhered to regarding IT project management. North Dakota Century Code contains directives that must be followed and Chapter 54, Sections 35 and 59 are two areas directly impacting IT projects.

Standards have been adopted and an example of a standard for large projects is STD009-05. Standards adopted for the State of North Dakota can be found at <a href="http://www.state.nd.us/ea/standards/standards/">http://www.state.nd.us/ea/standards/standards/</a>. Additional information can be found at <a href="http://www.state.nd.us/epm/">http://www.state.nd.us/epm/</a>.

The approvals required for IT and related technology projects differ for Higher Education than State Government. North Dakota Century Code defines those areas of the code that apply and which do not.

In addition, both the State and Higher Education have specific procedures that apply to procurement of product and services that apprentices and mentors need to be mindful of as part of project management.

## <u>Section XXVI. – North Dakota State and Higher Education Methodology</u>

Apprentices and mentors need to be aware of, and keep in mind, that there is a generally accepted project management methodology. A guidebook (North Dakota Project Management Guidebook) has been created by the North Dakota Enterprise Project Management Advisory Group for use across the enterprise. The North Dakota Project Management Guidebook can be found at the following URL, <a href="http://www.state.nd.us/epm/resources/doc/guide.pdf">http://www.state.nd.us/epm/resources/doc/guide.pdf</a>. This guidebook follows the Project Management Institute's Project Management Body of Knowledge (PMBOK Guide) with adaptations related to North Dakota's needs.

Participants in the NITAS apprenticeship program are to be aware that the program will be based on the North Dakota Project Management Guidebook.

# PROJECT MANAGEMENT APPRENTICESHIP AND MENTORING PROGRAM Program Guidelines

#### **DEFINITIONS**

**Apprentice** – An apprentice is any individual employed by the State of North Dakota and who is registered with NITAS for a specific apprenticeship concentration. The apprentice is responsible to drive their own learning process. The apprentice will seek out appropriate related learning opportunities, coordinate and schedule mentoring sessions, and track and report progress on skills validation items (i.e. qual cards). The apprentice is responsible and accountable for the success of the project used in the NITAS apprenticeship program.

**Mentor** – Also referred to as "coach". For this program, the term mentor will be used and will be synonymous with NITAS' definition of "coach". A mentor is an individual who provides guidance and instruction to an apprentice or multiple apprentices. The mentor guides the apprentice in his/her learning through training and on-the-job learning. The mentor and the apprentice utilize the Qual Card, working through the "Know", "Do", and "Exit Criteria" to validate the apprentice's level of task proficiency. The mentor is the primary person responsible for validating that the apprentice has sufficient knowledge and skill in the competencies defined within a concentration. The mentor will validate the learning, but is neither responsible nor accountable for the success of the project used by the apprentice in the NITAS apprenticeship program.

**Sponsor** – The sponsor is the organization that is registered with NITAS and utilizes the apprenticeship model for skill development and on-the-job-learning. In this instance, the sponsor is the Information Technology Department and the designated sponsor contact is the Enterprise Project Management Office.

**Agency (aka Employer)** – For the purposes of this program, the term "agency" or "employer" refers to any State entity including the Executive, Judicial, and Legislative branches of government and the ND University System. The agency is responsible for sponsoring and supporting the apprentice through the NITAS program.

# **Appendix A – Project Management Concentration**

#### **Introduction to the Concentration**

The NITAS project management apprenticeship concentration contains three levels of proficiency.

#### Level 1

Successful completion of level 1 indicates that a worker is competent at an entry level in project management and has knowledge of basic project management concepts, has preparation to lead, manage or coordinate small IT projects or tasks.

#### Level 2

Completion of level 2 signifies that the employee is at a full working level in project management and is competent to manage IT projects of medium to large size and complexity. Completion of level 2 also indicates that the worker has mastery of basic communications and other soft skills required in an IT environment.

#### Level 3

Completion of level 3 signifies that the employee is a project management journey worker and is competent to handle very large scale IT projects and programs.

The proficiency levels 1-3 reflect cumulative learning and experience with increasing degrees of demonstrated knowledge, skill and overall competency in project management. The apprenticeship concentration requires the worker receive classroom instruction (or equivalent e-learning) and structured on-the-job-learning (OJL), skills validation, and certification.

#### **Completion Criteria**

Level	Required Hrs of PM Classroom Instruction	Required Hrs of OJL	Required Qualification and Skill Validations	Required Certifications
Level 1- Entry	24 hrs		30 items	
Level 2- Full Working	60 hrs	2000 hrs in IT Project Management	43 items	ND PMI Certification IT Project+ CAPM PMP
Level 3- Journey	60 hrs	2000 hrs in IT Project Management	47 items	PMP
Total	144 hrs	4000 hrs in IT project management	120 items	ND PMI Certification IT Project+ CAPM PMP

#### **Qualifications for Apprenticeship**

Apprentice Level 1

- Pre-requisites
  - Must have a small to medium sized project to manage.
  - Project Management should be identified by supervisor as necessary job function.

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#### Apprentice Level 2

- Pre-requisites
  - Must have a medium to large sized project to manage.
  - Project Management must be identified by supervisor as necessary job function.

#### Apprentice Level 3

- Pre-requisites
  - Must have a large project to manage (in excess of \$250,000 per biennium or \$500,000 over the life of the project).
  - Project Management must be identified by supervisor as necessary job function.

#### Mentor

- Pre-requisites
  - Must obtain NITAS Level 2 apprenticeship certificate.
    - Exception: February 2005 candidates must possess past experience and documentation that would allow the candidate to complete the required level within a six month period, including.
      - Documentation to support knowledge and experience to complete the Level 1 and Level 2 skills validation cards.
      - Must posses and document 2,000 hours of project management experience.
      - Documentation of 84 hours of PM related classroom or on-line learning.
      - ND ITD / PMI / Mayville State University Project Management Certification, OR IT Project+ Certification, OR Project Management Professional Certification.
      - Must participate in peer-mentoring (approximately 2-3 hours per week for 16-20 weeks).

#### **Time Considerations**

For the apprentice to be successful, it is critical that the employer and supervisor understand the time considerations placed upon the apprentice. Apprentices at any level of concentration will need time to work with the various elements of the program. This includes, but is not limited to time for; training, mentor meetings, documentation, certification preparation, and skills validation.

While a small or medium sized project would not necessarily utilize all of the project management skills taught, it is necessary for the apprentice to apply all of the skills to the selected project to complete the learning experience. This will require the apprentice to spend more time on the assigned project than might normally be required.

#### **Potential Costs**

A variety of costs may be incurred by the apprentice during the course of each concentration. Potential costs include, but are not limited to; registration (\$20-\$30 per concentration), certification preparation and examination fees, and training.

Exact training costs vary based on the type and source of the course. Some training will be provided at no cost via the Project Management User Group. However, this will not be sufficient to complete the training requirement in a timely manner.

#### Minimum / Maximum Term of Apprenticeship

All apprentices must complete the minimum 90 day probationary period. This will be required only once regardless of the number of concentrations attempted.

The Sponsor shall reserve the right to assign a maximum term of apprenticeship for each level of concentration to ensure that timely progress is made.

# **Appendix B – Apprentice Application**

				Current Date:	
Name:			Title:		
Current Position De	scription:				
Employer:					
Phone:		Email:			
Supervisor:			Title:		
Apprenticeship Con	centration: Project M	lanagement			
(Check all levels the	at apply)				
Level 1:	Level 2:	Level 3: □			
How many hours of Project Management experience do you presently have?					
(Upon acceptance, you will be asked to provide a detailed description of all experience)					
Are you presently working on a project, or do you have a future project assigned to you that will fulfill the minimum requirements of the level for which you are applying?  Yes \[ \] No \[ \]					

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If yes, please provide the name, description, size, complexity, approximate schedule, and approximate budget of the project.
Diagon describe why would you like to be involved in the NITAC Apprenticeable Dreampre
Please describe why would you like to be involved in the NITAS Apprenticeship Program?
Are you willing to be paired with a mentor from outside of your present employer?
Yes No
Please describe the characteristics and expertise you are looking for in a mentor.

# PROJECT MANAGEMENT APPRENTICESHIP AND MENTORING PROGRAM Program Guidelines – Appendix B

Apprentice					
I have read, understand, and agree to follow the provisions contained in the Apprenticeship and Mentoring Program Guidelines. I attest to the fact that all information contained in this application is true and accurate and understand that falsification of any information my result in dismissal from this program.					
Signature:	Date:				
Supervisor					
I have read, understand, and agree to the provisions contained in the Apprenticeship and Mentoring Program Guidelines.					
Signature:	Date:				
Agency IT Director					
I have read, understand, and agree to the provisions contained in the Apprenticeship and Mentoring Program Guidelines.					
Agency Priorities					
Of the Level applications submitted by this agency, I prioritize this application as number If the application requests multiple levels, please rank only the highest level (example: John Doe requests levels 1 and 2. Rank only the priority for level 2).					
Signature:	Date:				